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OFFICIAL JOURNAL OF THE AMERICAN ACADEMY OF PEDIATRICS

## **The Crucial Role of Recess in School COUNCIL ON SCHOOL HEALTH**

*Pediatrics* 2013;131;183; originally published online December 31, 2012;  
DOI: 10.1542/peds.2012-2993

The online version of this article, along with updated information and services, is  
located on the World Wide Web at:

<http://pediatrics.aappublications.org/content/131/1/183.full.html>

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## The Crucial Role of Recess in School

## COUNCIL ON SCHOOL HEALTH

## KEY WORDS

play, recess, school

## ABBREVIATION

AAP—American Academy of Pediatrics

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[www.pediatrics.org/cgi/doi/10.1542/peds.2012-2993](http://www.pediatrics.org/cgi/doi/10.1542/peds.2012-2993)

doi:10.1542/peds.2012-2993

PEDIATRICS (ISSN Numbers: Print, 0031-4005; Online, 1098-4275).

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## abstract

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Recess is at the heart of a vigorous debate over the role of schools in promoting the optimal development of the whole child. A growing trend toward reallocating time in school to accentuate the more academic subjects has put this important facet of a child's school day at risk. Recess serves as a necessary break from the rigors of concentrated, academic challenges in the classroom. But equally important is the fact that safe and well-supervised recess offers cognitive, social, emotional, and physical benefits that may not be fully appreciated when a decision is made to diminish it. Recess is unique from, and a complement to, physical education—not a substitute for it. The American Academy of Pediatrics believes that recess is a crucial and necessary component of a child's development and, as such, it should not be withheld for punitive or academic reasons. *Pediatrics* 2013;131:183–188

## THE BENEFITS OF RECESS FOR THE WHOLE CHILD

The Centers for Disease Control and Prevention defines recess as “regularly scheduled periods within the elementary school day for unstructured physical activity and play.”<sup>1</sup> The literature examining the global benefits of recess for a child's cognitive, emotional, physical, and social well-being has recently been reviewed.<sup>2</sup> Yet, recent surveys and studies have indicated a trend toward reducing recess to accommodate additional time for academic subjects in addition to its withdrawal for punitive or behavioral reasons.<sup>3–6</sup> Furthermore, the period allotted to recess decreases as the child ages and is less abundant among children of lower socioeconomic status and in the urban setting.<sup>4,7</sup>

Just as physical education and physical fitness have well-recognized benefits for personal and academic performance, recess offers its own, unique benefits. Recess represents an essential, planned respite from rigorous cognitive tasks. It affords a time to rest, play, imagine, think, move, and socialize.<sup>8–11</sup> After recess, for children or after a corresponding break time for adolescents, students are more attentive and better able to perform cognitively.<sup>12–16</sup> In addition, recess helps young children to develop social skills that are otherwise not acquired in the more structured classroom environment.<sup>8,11,17</sup>

## COGNITIVE/ACADEMIC BENEFITS

Children develop intellectual constructs and cognitive understanding through interactive, manipulative experiences. This type of exploratory

experience is a feature of play in an unstructured social environment.<sup>8,18</sup> Optimal cognitive processing in a child necessitates a period of interruption after a period of concentrated instruction.<sup>19,20</sup> The benefits of these interruptions are best served by unstructured breaks rather than by merely shifting from 1 cognitive task to another to diminish stresses and distractions that interfere with cognitive processing.<sup>9,11,15,20</sup> Several studies demonstrated that recess, whether performed indoors or outdoors, made children more attentive and more productive in the classroom.<sup>11–13,16,19,21</sup> This finding was true even though, in many cases, the students spent much of their recess time socializing. In fact, a student's ability to refocus cognitively was shown to be stimulated more by the break from the classroom than by the mode of activity that occurred during that break; any type of activity at recess benefited cognitive performance afterward.<sup>14</sup> Although specified time afforded for recess diminishes with age, the benefits of periodic breaks in the academic day to optimize cognitive processing applies equally to adolescents and to younger children.

## **SOCIAL AND EMOTIONAL BENEFITS**

Recess promotes social and emotional learning and development for children by offering them a time to engage in peer interactions in which they practice and role play essential social skills.<sup>8,17,18,22,23</sup> This type of activity, under adult supervision, extends teaching in the classroom to augment the school's social climate. Through play at recess, children learn valuable communication skills, including negotiation, cooperation, sharing, and problem solving as well as coping skills, such as perseverance and self-control.<sup>8–11,15,17,22</sup> These skills become fundamental, lifelong personal tools.

Recess offers a child a necessary, socially structured means for managing stress. By adapting and adjusting to the complex school environment, children augment and extend their cognitive development in the classroom.<sup>15,17</sup>

## **PHYSICAL BENEFITS**

There is a wealth of literature published on the need for and benefit of physical activity and fitness, not only for a child's physical well-being but also for academic and social maturation.<sup>5,12,22–33</sup> Although not all children play vigorously at recess, it does provide the opportunity for children to be active in the mode of their choosing and to practice movement and motor skills. Importantly, recess affords young children free activity for the sheer joy of it.<sup>34</sup> Even minor movement during recess counterbalances sedentary time at school and at home and helps the child achieve the recommended 60 minutes of moderate to vigorous activity per day, a standard strongly supported by the American Academy of Pediatrics (AAP) policy, which can help lower risk of obesity.<sup>5,12,30–35</sup>

## **SAFETY AND SUPERVISION**

A child's safety during recess is a concern for many parents, teachers, and administrators. Some schools even have chosen to ban games or activities deemed unsafe and, in some cases, to discontinue recess altogether in light of the many issues connected with child safety.<sup>10,36</sup> Although schools should ban games and activities that are unsafe, they should not discontinue recess altogether just because of concerns connected with child safety. There are measures schools can take to address these concerns and protect children while still preserving play during recess.<sup>5,11,24,28,34,37,38</sup> Compliance with the Consumer Product Safety Commission's

Playground Safety Handbook (<http://www.cpsc.gov/CPSC/PUBS/PUBS/325.pdf>) will help to ensure proper maintenance of playground equipment that meets all of the following applicable federal guidelines:

1. Provision of adequate safe spaces and facilities.
2. Maintenance of developmentally appropriate equipment with regular inspections.
3. Establishment and enforcement of safety rules.
4. Implementation of recess curriculum in physical education classes to teach games, rules, and conflict resolution.
5. Establishment of a school-wide, clear policy to prevent bullying or aggressive behavior.
6. Provision of adequate supervision by qualified adults who can intervene in the event a child's physical or emotional safety is in jeopardy.

Some playgrounds in areas with a high risk of violence may require additional protective measures to ensure the safety of children.

## **THE EMERGING ISSUE OF STRUCTURED RECESS**

Structured recess is a recess based on structured play, during which games and physical activities are taught and led by a trained adult (teachers, school staff, or volunteers). Proponents for structured recess note that children often need help in developing games and require suggestions and encouragement to participate in physical activities. Recently, policy makers and funding organizations have called for more opportunities for daily activity as a means to address childhood obesity. These statements have strengthened the argument to maintain or reinstate recess as an integral component of the school day.<sup>12,25,30,34</sup> Although this new dimension to the recess debate has

increased attention on its role, it also has created tension. Some have promoted recess time as a solution for increasing children's physical activity and combating obesity. If recess assumes such a role, then, like physical education, it will need to be planned and directed to ensure that all children are participating in moderately vigorous physical activity.<sup>4,7,12,31,33,38</sup> Pediatric health care providers, parents, and school officials should be cognizant, however, that in designing a structured recess, they will sacrifice the notion of recess as an unstructured but supervised break that belongs to the child; that is, a time for the child to make a personal choice between sedentary, physical, creative, or social options.<sup>2,8–10,18,22–24,30,34,37,39</sup> However, there are many cited benefits of structured recess to consider, including<sup>12</sup>:

- Older elementary children may benefit from game instruction and encouragement for total class inclusion.
- Children can be coached to develop interpersonal skills for appropriate conflict resolution.
- More children can actively participate in regular activity, irrespective of skill level.
- Anecdotally, teachers have reported improved behavior and attention in the classroom after vigorous structured recess.

To be effective, structured recess requires that school personnel (or volunteers) receive adequate training so that they are able to address and encourage the diverse needs of all students.<sup>12,38</sup> One aspect of supervision should be to facilitate social relationships among children by encouraging inclusiveness in games. A problem arises when the structured activities of recess are promoted as a replacement for the child's physical education requirement. The replacement of physical

education by recess threatens students' instruction in and acquisition of new motor skills, exploration of sports and rules, and a concept of lifelong physical fitness.<sup>24,30,34</sup>

There are ways to encourage a physically active recess without necessarily adding structured, planned, adult-led games, such as offering attractive, safe playground equipment to stimulate free play; establishing games/boundaries painted on the playground; or instructing children in games, such as four square or hopscotch.<sup>37,38,40</sup> These types of activities can range from fully structured (with the adult directing and requiring participation) to partly unstructured (with adults providing supervision and initial instruction) to fully unstructured (supervision and social guidance). In structured, partly structured, or unstructured environments, activity levels vary widely on the basis of school policy, equipment provided, encouragement, age group, gender, and race.<sup>4,7,30,38,40</sup> Consequently, the potential benefits of mandatory participation of all children in a purely structured recess must be weighed against the potential social and emotional trade-off of limiting acquisition of important developmental skills. Whichever style is chosen, recess should be viewed as a supplement to motor skill acquisition in physical education class.<sup>5,23,24,33,34</sup>

## DURATION AND TIMING OF RECESS

In the United States, the duration and timing of recess periods vary by age, grade, school district, and sometimes by building.<sup>4,7</sup> The majority of elementary schools that offer lunch-time recess do so after the students eat lunch.<sup>4,37,41–44</sup> Many school wellness councils have adopted the "Recess Before Lunch" concept which stems from studies that examined food waste by students in relation to the

timing of their recess.<sup>42–44</sup> When students have recess before lunch, more time is taken for lunch and less food is wasted. In addition, teachers and researchers noted an improvement in the student behavior at meal time, which carried into the classroom in the afternoon. The Centers for Disease Control and Prevention and the US Department of Agriculture support the concept of scheduling recess before lunch as part of a school's wellness policy.<sup>2,45</sup>

Peer-reviewed research has examined the timing and type of activity during recess and chronicled the many benefits of recess for children, without establishing an optimal required duration.<sup>2,8,12,13,18,19,21</sup> There is consensus about the need for regularly scheduled recess based on national guidelines, even though the length of the recess period has not been firmly established. In schools, the length specified for recess ranges widely, from 20 to 60 minutes per day.<sup>24,30</sup> In other countries, such as Japan, primary school-aged children have a 10- to 15-minute break every hour, and this is thought to reflect the fact that attention spans begin to wane after 40 to 50 minutes of intense instruction.<sup>46</sup> On the basis of this premise, to maximize cognitive benefits, recess should be scheduled at regular intervals, providing children sufficient time to regain their focus before instruction continues.

## CONCLUSIONS

School attendance represents a unique opportunity to address nutrition and physical fitness. Each day, 55 million US students attend school, which constitutes nearly one-half of their wakeful hours.<sup>47</sup> In light of rising rates of overweight and obesity, schools have come under increased scrutiny. Within the school environment, there are competing calls for stricter standards and greater academic achievement as

well as calls for schools to provide greater opportunities for nonsedentary daily activity. Even with ample evidence of a whole-child benefit from recess, significant external pressures, such as standardized cognitive testing mandated by educational reforms, have led some to view recess as time that would be better spent on academics.<sup>4</sup> Time previously dedicated to daily activity in school, such as physical education and recess, is being reallocated to make way for additional academic instruction.

Ironically, minimizing or eliminating recess may be counterproductive to academic achievement, as a growing body of evidence suggests that recess promotes not only physical health and social development but also cognitive performance.<sup>10,37</sup> Although recess and physical education both promote activity and a healthy lifestyle, it is only supervised but unstructured recess that offers children the opportunity to actually play creatively. In this sense, then, pediatricians' support of recess is an extension of the AAP's policy statement supporting free play as a fundamental component of a child's normal growth and development.<sup>16</sup> On the basis of an abundance of scientific studies, withholding recess for punitive or academic reasons would seem to be counterproductive to the intended outcomes and may have unintended consequences in relation to a child's acquisition of important life skills.

## RECOMMENDATIONS

In their role as child health experts, the pediatricians of the AAP stress the following perspective to parents, teachers, school administrators, and policy makers:

1. Recess is a necessary break in the day for optimizing a child's social, emotional, physical, and cognitive development. In essence, recess should be considered a child's personal time, and it should not be withheld for academic or punitive reasons.
2. Cognitive processing and academic performance depend on regular breaks from concentrated classroom work. This applies equally to adolescents and to younger children. To be effective, the frequency and duration of breaks should be sufficient to allow the student to mentally decompress.
3. Recess is a complement to, but not a replacement for, physical education. Physical education is an academic discipline. Whereas both have the potential to promote activity and a healthy lifestyle, only recess (particularly unstructured recess) provides the creative, social, and emotional benefits of play.
4. Recess can serve as a counterbalance to sedentary time and contribute to the recommended 60 minutes of moderate to vigorous activity per day, a standard strongly supported by AAP policy as a means to lessen risk of overweight.
5. Whether structured or unstructured, recess should be safe and well supervised. Although schools should ban games and activities that are unsafe, they should not discontinue recess altogether just because of concerns connected with child safety. Environmental conditions, well-maintained playground equipment, and well-trained supervisors are the critical components of safe recess.
6. Peer interactions during recess are a unique complement to the classroom. The lifelong skills acquired for communication, negotiation, cooperation, sharing, problem solving, and coping are not only foundations for healthy development but also fundamental measures of the school experience.

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*Pediatrics* 2013;131;183; originally published online December 31, 2012;  
DOI: 10.1542/peds.2012-2993

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